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DATE: February 24, 2012

TO: Kelley Chase, EPA Region 3 OSC

Cynthia Caporale, EPA Region 3 OASQA

THROUGH: **Ex. 4 - CBI**, SERAS Program Manager

FROM: Ex. 4 - CBI , SERAS QA/QC Officer

SUBJECT: VERIFICATION/COMPLETENESS CHECK – DIMOCK, PA LABORATORY DATA

File 12032A rsk 175.pdf, File 12032a tph purgeable.pdf, File 12032a tph extractable.pdf File 12033A rsk 175.pdf, File 12033a tph purgeable.pdf, File 12033a tph extractable.pdf

INTRODUCTION

On February 23, 2012, a review of the case narratives and corresponding certificates of analysis from the EPA R9 (Dissolved Gases, GRO, DRO/ORO Reports Posted Feb 21) was reviewed at the SERAS facility in accordance with the Follow-Up Verification/Completeness Check agreed upon during our teleconference on Wednesday 2/8/12.

The assumptions for this review include the following: 1) Case narratives from the Regional labs and/or subcontract labs have been reviewed in accordance with Regional or Environmental Services Assessment Team (ESAT) protocols and contain all pertinent and complete information to conduct the completeness check. SERAS will base this review on the information provided by the laboratory and not on an actual data package; and 2) SERAS will relay any "red" flags to the EPA R3 personnel to resolve and determine data usability.

OBSERVATIONS

In accordance with Table 1 – Field and QC Sampling Summary (Rev01 - 2/3/12), Table 2 – Sample Analytical Requirements Summary (Rev01 – 2/3/12), Methods for Groundwater and Surface Water Samples and the R9 SOPs for dissolved gases (SOP 325), Gasoline Range Organics (SOP380) and Diesel Range Organics (SOP 385), the following observations were noted and need to be clarified/resolved.

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- 1. It appears as if the sample results for methane were not qualified based on field or trip blank results. This becomes problematic to assess since it is not known if both trip blanks (TB08 and TB09) arrived in the same sample cooler or whether EB01 (equipment blank) collected on 1/28/12 is applicable to the samples collected on 1/30/12. The frequency of equipment blanks (1 per day, etc.) to be collected needs to be checked in the project-specific QAPP before any qualifications can be assigned. A consensus decision needs to be made if the highest level of contamination (method, field, trip, equipment blanks) will be used to qualify the results "U" with the RL being elevated to the highest level found in the blank or the results left "as is".
- 2. It is assumed that all instrument QC (RSD, %D, retention time windows, LCV, SCV, etc) were performed and within the acceptance criteria listed in the SOP.

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1. It is assumed that all instrument QC (RSD, %D, retention time windows, LCV, SCV, etc) were performed and within the acceptance criteria listed in the SOP.

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- 1. For the samples run under batch B2B0008, the highest level of methane in the blanks was found in TB12 at a concentration of $1.2~\mu g/L$. All samples including one field blank and four trip blanks) were received at the laboratory on 2/2/12. Again it is not known if all samples arrived in the same sample cooler or if three separate coolers were received corresponding to each COC. A consensus decision needs to be made if the highest level of contamination (method, field, trip, equipment blanks) will be used to qualify the results "U" with the RL being elevated to the highest level found in the blank or the results left "as is".
- 2. It is assumed that all instrument QC (RSD, %D, retention time windows, LCV, SCV, etc) were performed and within the acceptance criteria listed in the SOP.

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cc: Sella Burchette, SERAS Project Officer
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Ex. 4 - CBI SERAS Task Leader

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